PRODUCT INFORMATION PACKET

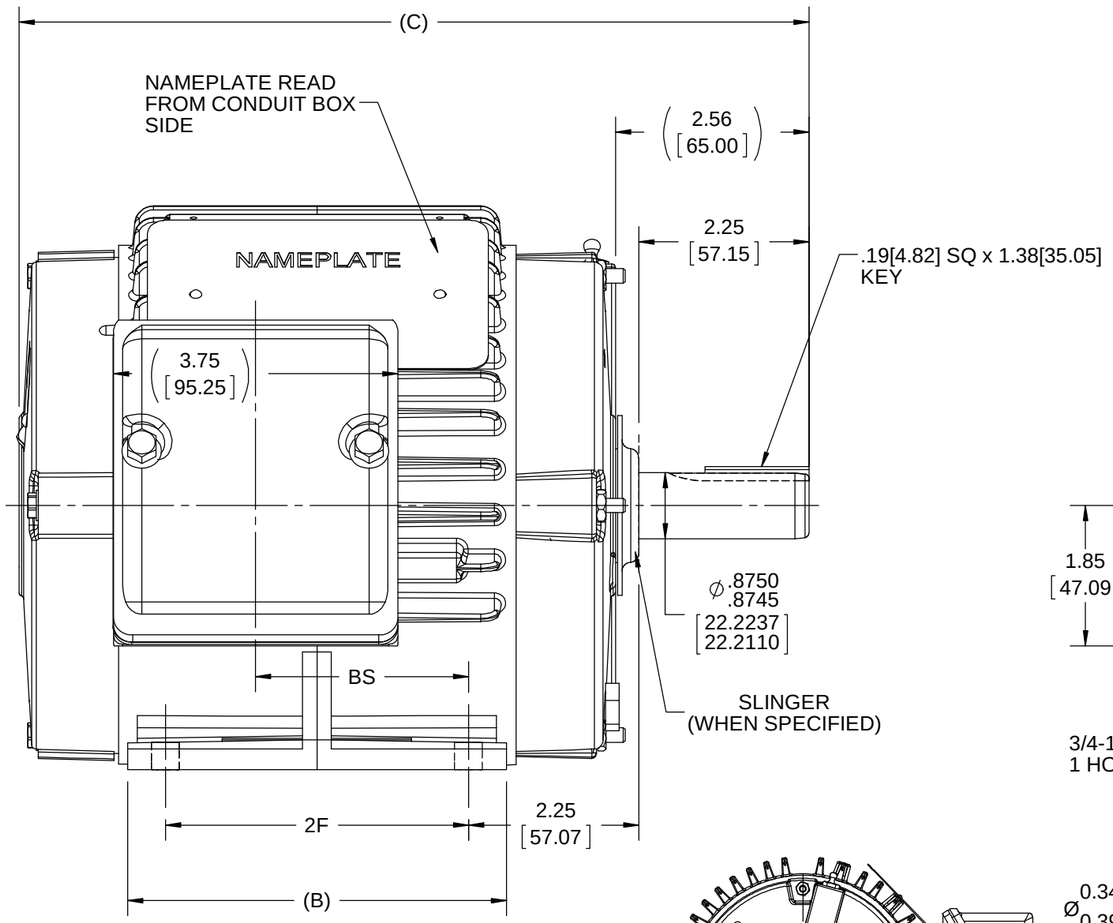
Model No: 145TTTN16631
Catalog No: E464A
Severe Duty Motor, 1.50 HP, 3 Ph, 60 Hz, 230/460 V, 1800 RPM, 145T Frame, TENV

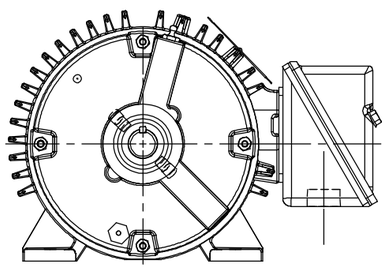
Nameplate Specifications

Phase	3	Output HP	1.50 Hp
Output KW	1.1 kW	Voltage	230/460 V
Speed	1755 rpm	Service Factor	1.15
Frame	145T	Enclosure	Totally Enclosed Non Ventilated
Thermal Protection	No Protection	Efficiency	86.5 %
Ambient Temperature	40 °C	Frequency	60 Hz
Current	4.6/2.3 A	Power Factor	71
Duty	Continuous	Insulation Class	F
Design Code	A	KVA Code	P
Drive End Bearing Size	6205	Opp Drive End Bearing Size	6203
UL	Recognized	CSA	Y
CE	Y	IP Code	54
Number of Speeds	1	Hazardous Location	DIVISION 2 T2B

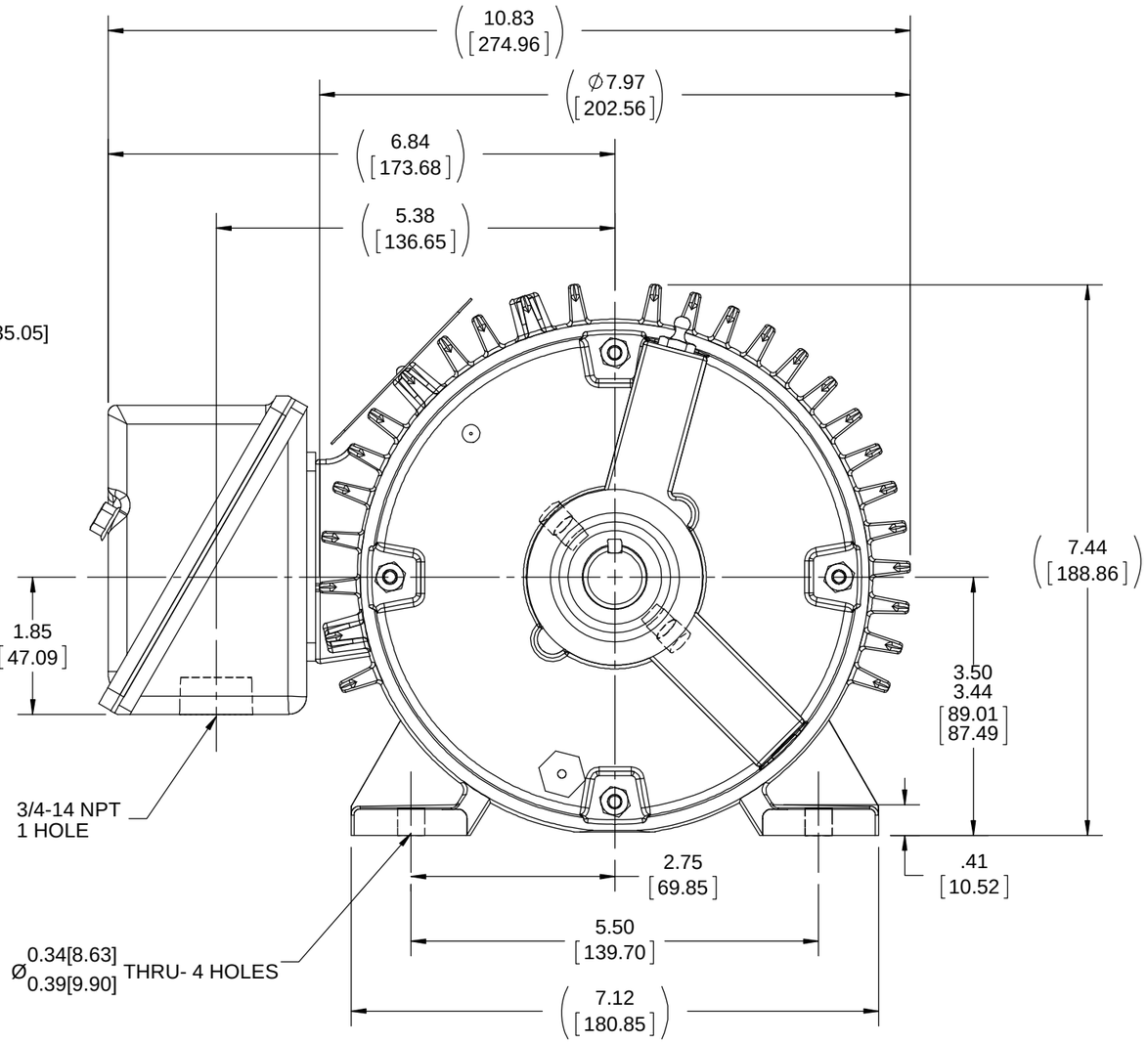
Technical Specifications

Electrical Type	Squirrel Cage Inverter Rated	Starting Method	Line Or Inverter
Poles	4	Rotation	Reversible
Resistance Main	7.9 Ohms	Mounting	Rigid Base
Motor Orientation	Horizontal	Drive End Bearing	Ball
Opp Drive End Bearing	Ball	Frame Material	Cast Iron
Shaft Type	T	Overall Length	11.43 in
Frame Length	6.25 in	Shaft Diameter	0.875 in
Shaft Extension	2.25 in	Assembly/Box Mounting	F1/F2 CAPABLE
Inverter Load	CONSTANT 1000:1		
Outline Drawing	A-100658-625	Connection Drawing	EE7308





F2 MOUNTING



DASH	B	C	BS	2F
525	5.00 [127.00]	10.43 [264.92]	2.81 [71.37]	4.00 [101.60]
625	6.00 [152.4]	11.43 [29.32]	3.81 [96.77]	5.00 [127.00]

NOTES:

1. BOX CAN BE ROTATED IN 90° STEPS.
2. BOX CAN BE MOUNTED ON OPPOSITE SIDE BY REMOVING BRACKETS AND TURNING FRAME 180°.
3. FRONT GREASE HOLE LOCATION SHOWN WITH HIDDEN LINES.

DRAWING REVISION	REVISION BY	DATE
C	H. ADIKE	06/25/2018
ECO	APPROVED BY	DATE
ECO-0147607	PST	06/25/2018

ECO DESCRIPTION
THE GREASE ZERK ROTATED TO 1 O'CLOCK POSITION

TOLERANCES UNLESS OTHERWISE SPECIFIED:

DEC.	INCH	mm	ANGLE
.X	±0.1	[±2.5]	±7' 30"
.XX	±0.03	[±0.76]	
.XXX	±0.005	[±0.127]	
.XXXX	±0.0005	[±0.0127]	

REMOVE BURRS & BREAK SHARP EDGES: .003/.015 [.076/.381] X 45 °
CORNER FILLETS: R.02 [.51]
MACHINED SURFACES: 200 INCH / 5.1 mm
mm SHOWN IN [BRACKETS]

DRAWN BY	RM
DATE	10/27/1992
APPROVED BY	JA
DATE	11/02/1992
REFERENCE	100658
THIRD ANGLE PROJECTION	

REGAL™ Regal Beloit America, Inc.

DESCRIPTION
OUTLINE
140T FR. - BB- TS - TENV

MATERIAL	PROCESS/FINISH

SIZE	DRAWING NUMBER	SHEET
B	100658	1 OF 1

EE7308

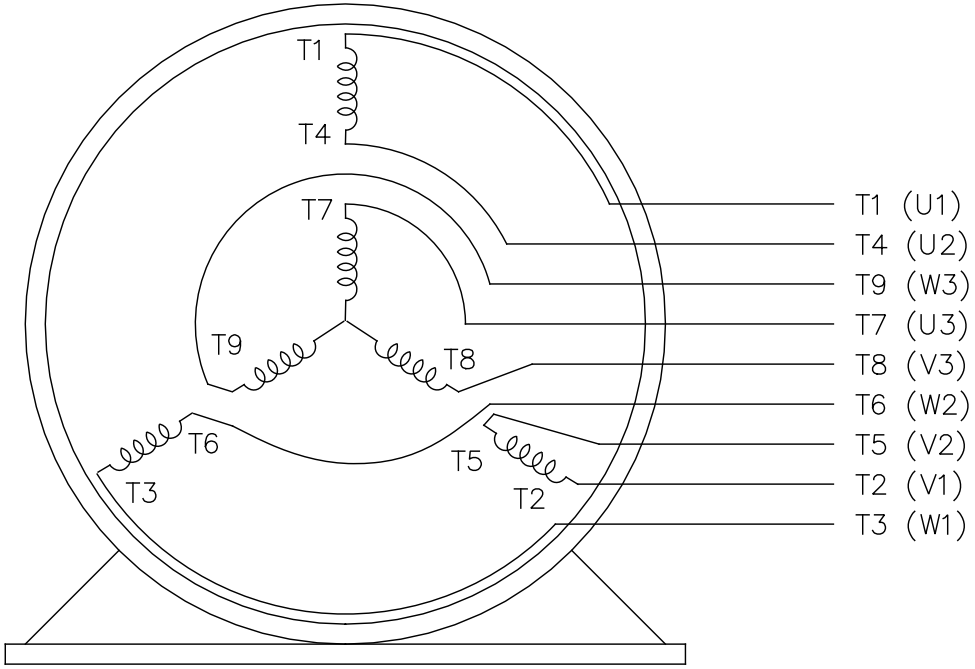
THREE PHASE
DUAL VOLTAGE MOTOR

HIGH VOLTAGE

(U1) T1 — L1
(V1) T2 — L2
(W1) T3 — L3
(U2) T4
(U3) T7
(V2) T5
(V3) T8
(W2) T6
(W3) T9

LOW VOLTAGE

(U1) T1
(U3) T7 — L1
(V1) T2
(V3) T8 — L2
(W1) T3
(W3) T9 — L3
(U2) T4
(V2) T5
(W2) T6



VIEW OF TERMINAL END

REF.
WINDING DIAGRAM

T8Y, T2Y, T2BL, T4BX, T2EC, T2G
T6BZ, T2B, T6BL, T4AV, T6B, T4B

OPTIONAL CORD CONNECTION

L1 — WHITE
L2 — RED
L3 — BLACK

NO.	REVISION	BY & DATE	CHK
5	CHG TO REGAL LOGO	SL 09/10/2015	AB
4	REVISED IEC NOTATIONS	MSG 11/15/2011	CMN
3	ADDED IEC NOTATIONS... (U1), (V1) ETC. MU95194	MSG 5/10/2010	MJS
2	ADDED THE OPTIONAL CORD CONNECTION MU46318	RDH 04/24/2003	DRS
1	REDRAWN	RM 11/20/1990	

TOLERANCES UNLESS SPECIFIED

	DEC.	INCHES
	.X	±.1
	.XX	±.02
	.XXX	±.005
	.XXXX	±.0005
ANG		±7'30"

REGAL™ Regal Beloit America, Inc.

TITLE CONNECTION DIAGRAM
3ø – DUAL VOLTAGE MOTOR

MAT'L.
FINISH
CAD FILE ee7308
RFP
DIST WP

DRAWN RM	11/20/1990
CHK ML	11/21/1990
APPD SAS	04/24/2003
SCALE	1=1
REF	
FMF	
PREV	

SIZE A | DRAWING NO. EE7308 | PAGE OF | REV. 5

LEESON™

DATA VOLTS: 460

CERTIFICATION DATA SHEET

CUSTOMER:
ORDER #:
CONN. DIAGRAM: EE7308
OUTLINE: A-100658-625
WINDING: ZT4256 R3 3
SPEED:

CUSTOMER P.O. #:
REFERENCE MODEL #: 145TTTN16631
CAT #: E464A
CUSTOMER PART #:
MOUNTING: F1/F2 CAPABLE

TYPICAL MOTOR PERFORMANCE DATA

HP	KW	SYNC RPM	FL RPM	FRAME	ENCLOSURE	TYPE	KVA CODE	DESIGN
1.5	1.1	1800	1755	145T	TENV	TTN	P	A

PH	HZ	VOLTS	AMPS	START TYPE	DUTY	INSL	S.F.	AMB	ELEV.
3	60	230/460	4.6/2.3	LINE OR INVERTER	CONT	F	1.15	40	3300

F.L. EFF	86.5	3/4 LD EFF	85.5	1/2 LD EFF	82.5	GTD EFF	ELECT. TYPE
F.L. PF	71.0	3/4 LD PF	62.5	1/2 LD PF	49.0	84.0	SQ CAGE INV RATED

F.L. TORQUE	LR AMPS @ 460 V	L.R. TORQUE	B.D. TORQUE	F.L. RISE (°C)	
4.5 LB-FT	24.0	21.2 LB-FT 471%	26.0 LB-FT 578%	70	

@ 3 FT.	POWER	ROTOR WK²	MAX. LOAD WK²	SAFE STALL TIME	STARTS/HOUR	MOTOR WGT
62 dBA	71 dBA	0.14 LB-FT²	10 LB-FT²	20 SEC.	2	50 LB.

*** SUPPLEMENTAL INFORMATION ***

DE BRACKET TYPE	ODE BRACKET TYPE	MOUNT TYPE	MOTOR ORIENTATION	SEVERE DUTY	HAZARDOUS LOCATION	DRIP COVER	SCREENS	PAINT
STANDARD	STANDARD	RIGID	HORIZONTAL	UM SEVERE	DIVISION 2 T2B	NO	NONE	BLUE (POWDER)

BEARINGS DE	BEARINGS ODE	GREASE	SHAFT TYPE	SPECIAL DE	SPECIAL ODE	SHAFT MATERIAL	FRAME MATERIAL
BALL 6205	BALL 6203	POLYREX EM	T	NONE	NONE	1144 STRESSPROOF (C-223)	CAST IRON

THERMOSTATS	PROTECTORS	WDG RTD's	BRG RTD's	THERMISTORS	CONTROL	SPACE HEATERS
NONE	NOT	NONE	NONE	NONE	FALSE	NA

R1 (ohms/ph)	R2 (ohms/ph)	X1 (ohms/ph)	X2 (ohms/ph)	Xm (ohms/ph)	VIBRATION (in/sec)	FLOAT
4.838	3.78	7.125	7.163	189.605	0.080	ODE

*
NOTES
*

INVERTER TORQUE: CONSTANT 10:1
INV. HP SPEED RANGE: 1.5 X BASE SPEED

ENCODER: NONE
NONE
NONE NONE **PPR**

BRAKE: NONE
NONE NONE
FT-LB: NA
VOLTAGE: NONE **HZ:**
UL: V-INS, CONST UL REC

PREPARED BY: FAREEDA DUDEKULA
DATE: 8/31/2018

FORM: 3531 REV_4 2/27/06

REV 1 - CHANGED LOGO FROM MARATHON TO LEESON - 3/25/2025

Data Sheet

Date: 12/14/2018
Customer:
Attention:
Submitted by: FAREEDA DUDEKULA

LEESON

145TTTN16631

Submittal

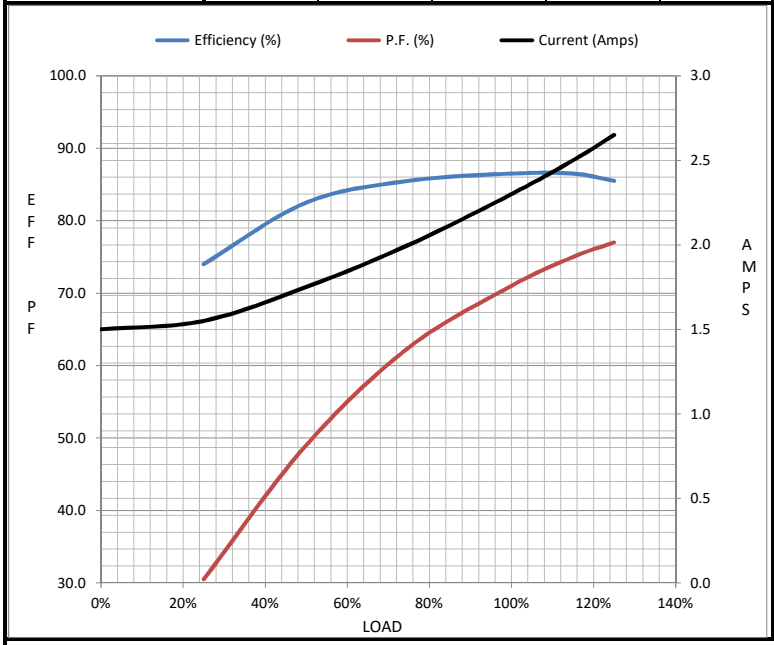
Data @ 460 V

Motor Load Data

Load	0%	25%	50%	75%	100%	115%	125%	LR	
Current (Amps)	1.50	1.55	1.75	2.00	2.30	2.50	2.65	24.0	
Torque (ft-lb)	0.00	1.10	2.20	3.5	4.5	5.2	5.7	21.2	
RPM	1800	1790	1780	1765	1755	1,750	1745	0	
Efficiency (%)		74.0	82.5	85.5	86.5	86.5	85.5		
P.F. (%)	7.5	30.5	49.0	62.5	71.0	75.0	77.0	69.5	

Motor Speed Data

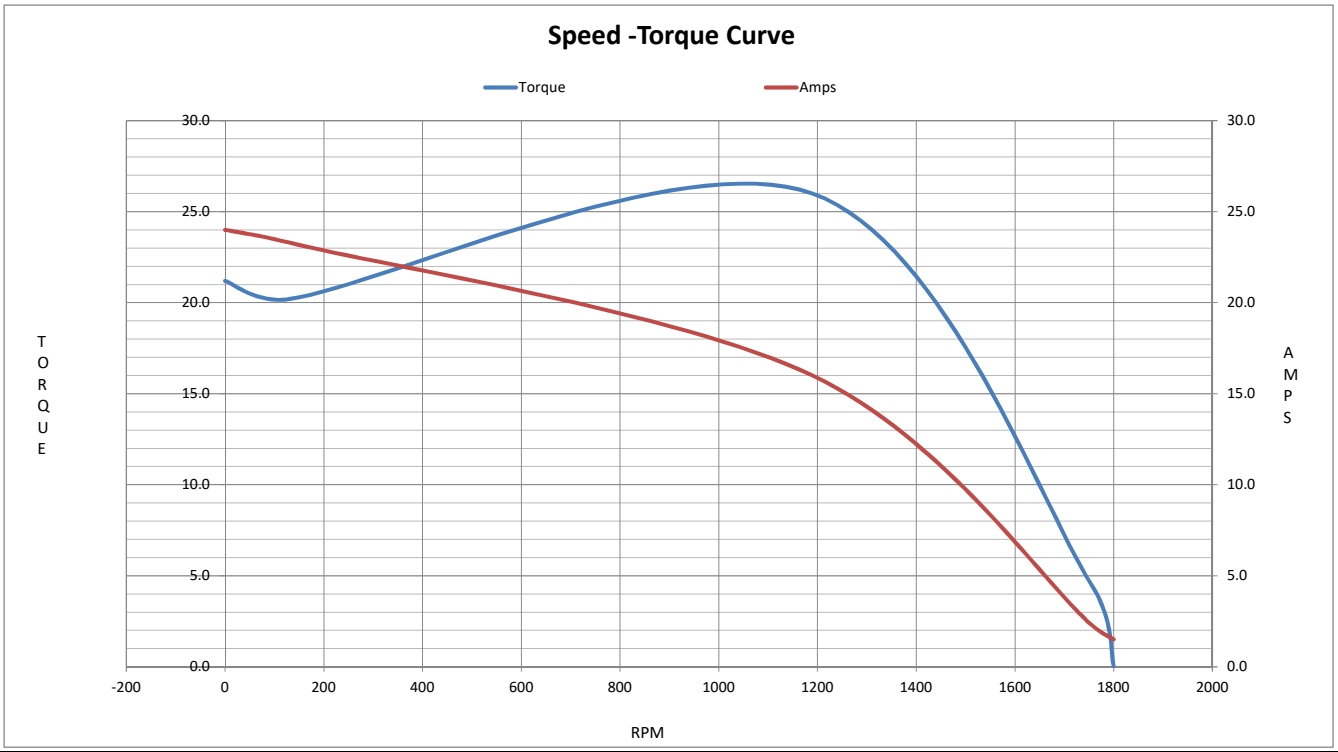
	LR	Pull-Up	BD	Rated	Idle
Speed (RPM)	0	130	1190	1755	1800
Current (Amps)	24.0	23.3	16.0	2.30	1.50
Torque (ft-lb)	21.2	20.2	26.0	4.5	0.00



Information Block		
HP	1.5	
Sync. RPM	1800	
Frame	145	
Enclosure	TENV	
Construction	TTS	
Voltage	230/460	V
Frequency	60	Hz
Design	A	
LR Code letter	P	
Service Factor	1.15	
Temp Rise @ FL	70	° C
Duty	CONT	
Ambient	40	° C
Elevation	1,000	feet
Rotor/Shaft wk²	0.14	Lb-Ft²
Ref Wdg	ZT4256 R3	
Sound Pressure @ 1M	62	dBA
VFD Rating	CONSTANT 10:1	
Outline Dwg	A-100658-625	
Conn. Diag	EE7308	
Additional Specifications:		
0		
0		

EQUIV CKT (OHMS / PHASE)

R1	R2	X1	X2	Xm
4.8380	3.7800	7.1250	7.1630	189.6050



EC Declaration of Conformity

The undersigned representing
the manufacturer:

Regal Beloit America
1946 West Cook Road
Fort Wayne, IN 46818

and the authorized representative
established within the Community:

Regal Beloit Italy
Via Modena, 18
24040 Ciserano(BG) - Italy

are committed to providing customers with products that comply with applicable regulations and international protocols to which they are subject, including the requirements of the European Parliament Directive on the Harmonization of the laws relating to electrical equipment designed for use within certain voltage limits (2014/35/EU).

Regal Beloit America declares that the following product(s), to which this declaration relates, are in conformity with the relevant sections of the EC standards listed below.

This statement supersedes any statements previously issued pertaining to the product(s) listed below and is subject to change without notice.

Model No : 145TTTN16631

(Model No. may contain prefix and/or suffix characters)

Catalog No : E464A

Rework No : N/A

Directives :

Low Voltage Directive 2014/35/EU

Harmonized Standards Used :

EN 60034-1: 2010 (IEC 60034-1: 2010)
EN 60034-5: 2001/A1:2007 (IEC 60034-5: 2000/A1:2006)

Authorized Representative:

Zach Stauffer
Vice President, Engineering

Authorized Representative in the Community:

Stefano Casiraghi
Technology Director, Engineering

Created on 07/08/2025

CE 25